(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization International Bureau



10/524056

(43) International Publication Date 19 February 2004 (19.02.2004)

PCT

(10) International Publication Number WO 2004/014226 A1

(51) International Patent Classification⁷:

A61B 5/00

(21) International Application Number:

PCT/IL2003/000649

(22) International Filing Date: 6 August 2003 (06.08.2003)

(25) Filing Language:

English

(26) Publication Language:

English

(30) Priority Data:

60/402,378

9 August 2002 (09.08.2002) US

(71) Applicant (for all designated States except US): INTER-CURE LTD. [IL/IL]; Kislev Building, 9 HaMalkah Street, 71100 Lod (IL).

(72) Inventor; and

(75) Inventor/Applicant (for US only): GAVISH, Benjamin [IL/IL]; P.O. Box 1141, 90805 Mevasseret Zion (IL).

(74) Agents: SANFORD T. COLB & CO. et al.; P.O. Box 227^B, 76122 Rehovot (IL).

(81) Designated States (national): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (regional): ARIPO patent (GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

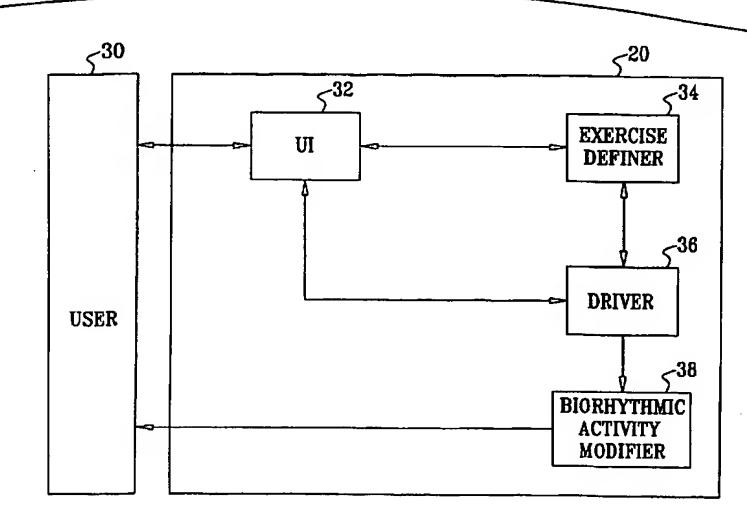
Published:

— with international search report

before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: GENERALIZED METRONOME FOR MODIFICATION OF BIORHYTHMIC ACTIVITY



(57) Abstract: Apparatus (20) for use with a subject (30) is provided, including a memory, storing a set of computer instructions, the memory adapted to have stored therein an initial form of a multi-phase biorhythmic activity pattern and an indication of a desired form of the multi-phase biorhythmic activity pattern, wherein a ratio of durations of two phases in the desired form is different from a ratio of durations of the respective phases in the initial form, and wherein at least one phase of the multi-phase biorhythmic activity pattern corresponds to a respective phase of a multi-phase biorhythmic activity of the subject (30). The apparatus (20) further includes a stimulus unit (38), adapted to execute the stored instructions and to generate responsive thereto a time-varying stimulus that: (a) is substantially not responsive to ongoing measurement of the multi-phase biorhythmic activity during generation of the time-varying stimulus, and (b) has a multi-phase pattern that is characterized by a series of transitional forms intermediate the initial form and the desired form that guide the subject (30) to modify the biorhythmic activity.